

# Air Force Civil Engineer Center

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*FORMER  
WILLIAMS AIR FORCE BASE*

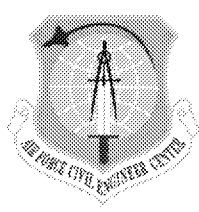
**Site LF004 Landfill  
Remedial Action**

**BCT Conference Call  
21 May2020**



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***Battle Ready...Built Right!***



## LF004 Recent and Upcoming Activities

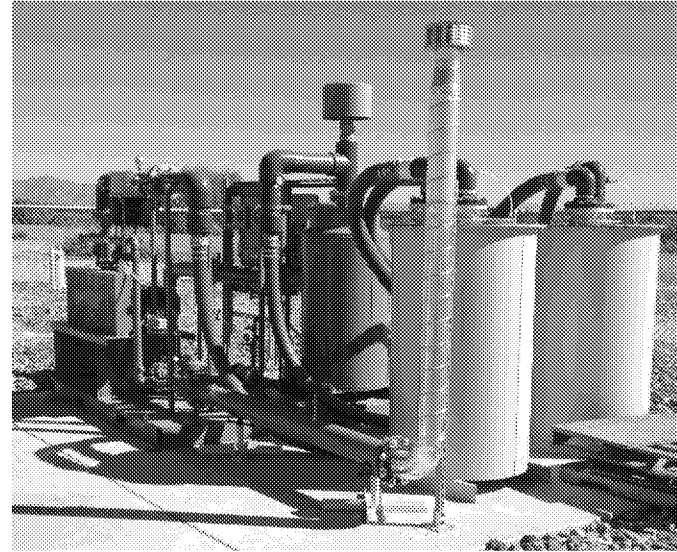
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- **Draft 2019 landfill inspection report under AF review**
- **SVE and well decommissioning documents submitted to EPA and ADEQ on 3 April 2020. ADEQ requested a time extension for reviewing document on 10 April 2020.**
- **PDB sampling results pending**



## LF01-W17 Area IWAS System Update

- Final November 2019 PDB results indicate all monitoring wells below the TCE MCL with the exception of LF01-W17S (7.9  $\mu\text{g/l}$ ) and LF01-W30M (10  $\mu\text{g/l}$ )
- Previous May 2019 PDB for LF01-W17S (9  $\mu\text{g/l}$ ) and LF01-W30M (12  $\mu\text{g/l}$ )
- Monitoring wells upgradient and downgradient of LF01-W17S and LF01-W30M are below TCE MCL
- PDB sampling results pending





## **Southern Area SVE and Oxidant Injection**

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- **Final November 2019 PDB results indicate only three PCE MCL exceedances: W19S at 7.8 µg/l (dup 8.2 µg/l), W19D 5.6 µg/l (dup 5.4 µg/l), and W24M at 6.2 µg/l (dup 5.4 µg/l). Previous May 2019 PDB results for W19S 8.1 µg/l (dup 9.1 µg/l), W19D <1.0 µg/l and W24M 9.7 µg/l (dup 8.6 µg/l).**
- **Upgradient wells in the vicinity of W19 and downgradient wells in the vicinity of W24 are below the PCE MCL**
- **PDB sampling results pending**



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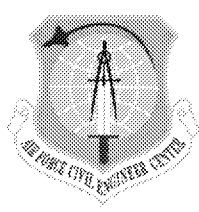
**Site FT002  
Fire Training Area Remedial  
Action**

**BCT Conference Call  
21 May 2020**



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# Site FT002 Update

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- **AF approved keeping the DEUR in place Nov 2018**
- **Draft Explanation of Significant Differences (ESD) document to add the land use control to the ROD is under AF review**
- **Revised Final Remedial Action Completion Report submitted 22 Nov 2019**
- **Received EPA comment letter on 31 Dec 2019. Received ADEQ comments on 12 Feb 2020. Response to comments under internal AF review.**
- **Draft ESD submitted for AF legal review April 2020**
- **SVE wells decommissioning completed on 14 May 2020**

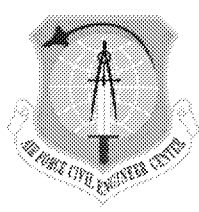
# **Air Force Civil Engineer Center**

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**FORMER  
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Site SS017  
Old Pesticide/Paint Shop**

**BCT Conference Call  
21 May 2020**



# Site SS017 Groundwater Monitoring Update

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- **Final Q3 (Aug) 2018 data summary report submitted 23 Apr 2020**
- **Final annual (Nov) 2018 groundwater report submitted 23 Apr 2020**
- **Final Q2 (Jun) 2019 data summary report submitted 23 Apr 2020**
- **Final Q3 (Aug) 2019 data summary report submitted 24 Apr 2020**
- **Draft Q4 (Nov) 2019 annual report submitted for regulatory review 27 Apr 2020**



# Parcel K-1-2 Property Transfer

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- **FOST (final version in track changes responding to EPA comments) was issued via email for regulatory concurrence 24 Jul 2019 with follow up email 9 Aug 2019**
- **FOST clean copy with all revisions, responses to comment and ADEQ requested changes issued 15 Oct 2019**
- **ADEQ concurrence previously received. EPA concurrence letter received 19 Dec 2019**
- **Final FOST is being routed for AF signature in April 2020**
- **Draft DEUR and assignment package to be prepared**

# **Air Force Civil Engineer Center**

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***FORMER  
WILLIAMS AIR FORCE BASE***

**Site ST012**

**Former Liquid Fuel  
Storage Area**

**BCT Conference Call  
21 May 2020**



# Site ST012 Outline

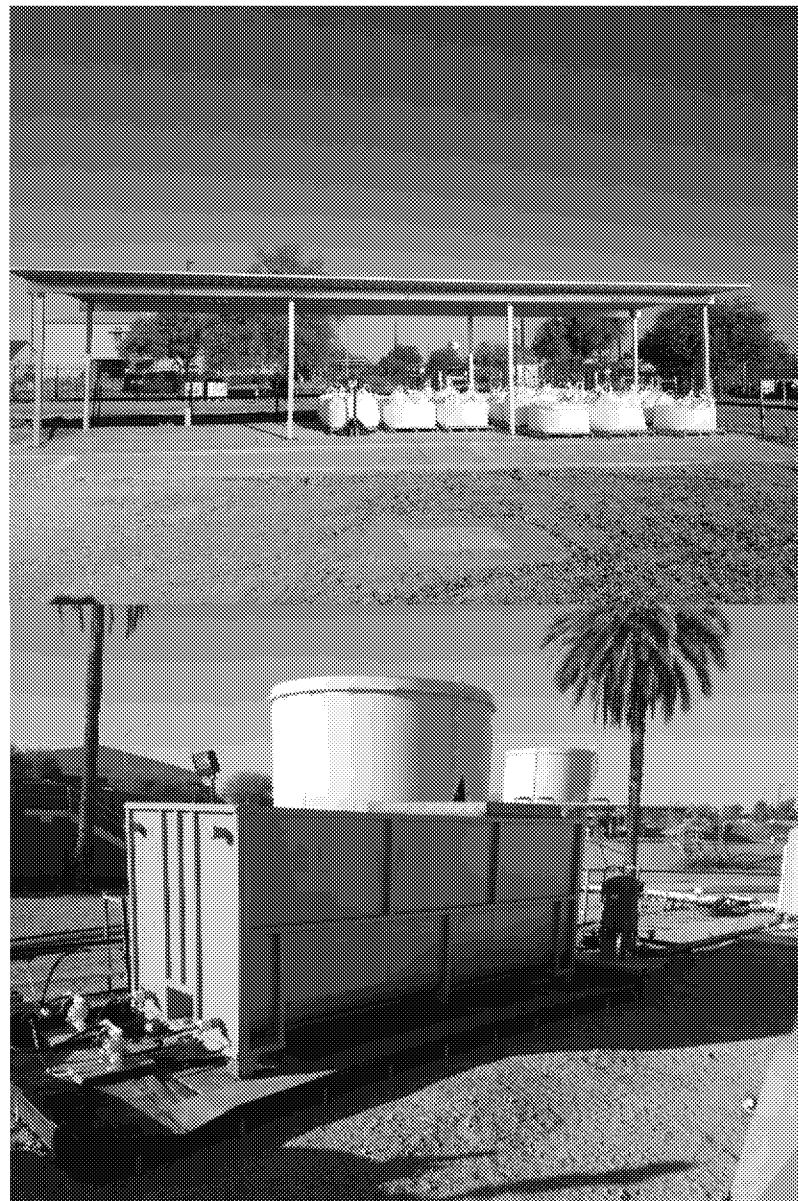
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- **Summary of activities since April BCT call**
- **LNAPL removal update**
- **Update on benzene and sulfate concentrations**
- **Pilot study extraction/injection update**
- **Path forward**



# Site ST012 Activities Since Feb

- **SVE Rotation on 7 May 2020, current status:**
  - Extraction wells: SVE03S, SVE03M, SVE03D, SVE09S, SVE11, and SVE14
  - Venting wells: SVE01S, SVE01M, SVE01D, SVE02M, SVE04M, SVE07S, SVE07M, SVE07D, and SVE13
  - Closed wells: SVE02S, SVE02D, SVE04S, SVE04D, SVE05S, SVE05M, SVE05D, SVE06S, SVE06M, SVE06D, SVE08S, SVE08M, SVE08D, SVE09M, SVE09D, SVE10, and SVE12
- **LNAPL screening in select wells**
- **Pump Repairs**
  - UWBZ21 continued with limited pumping due to high temperatures
  - UWBZ22 pneumatic pump plugging
  - UWBZ30 shut down due to sulfate arrival
  - CZ07 Motor replaced and pipe repaired
  - CZ23 has had sporadic electrical errors





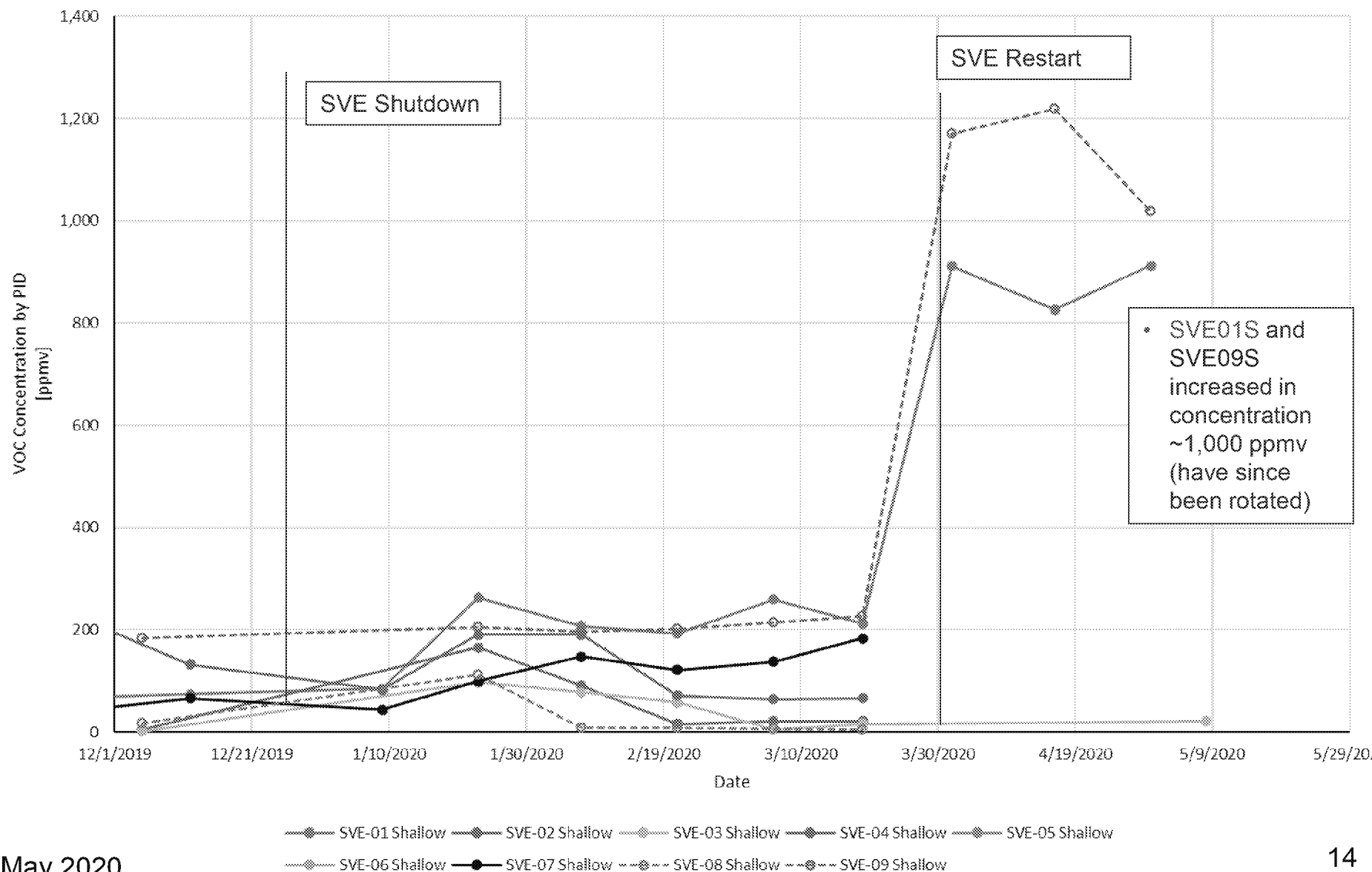


# SVE Update



# Site ST012 SVE System Post-Rebound Shallow Interval Zone (PID)

SVE Well Shallow Interval PID Readings



21 May 2020

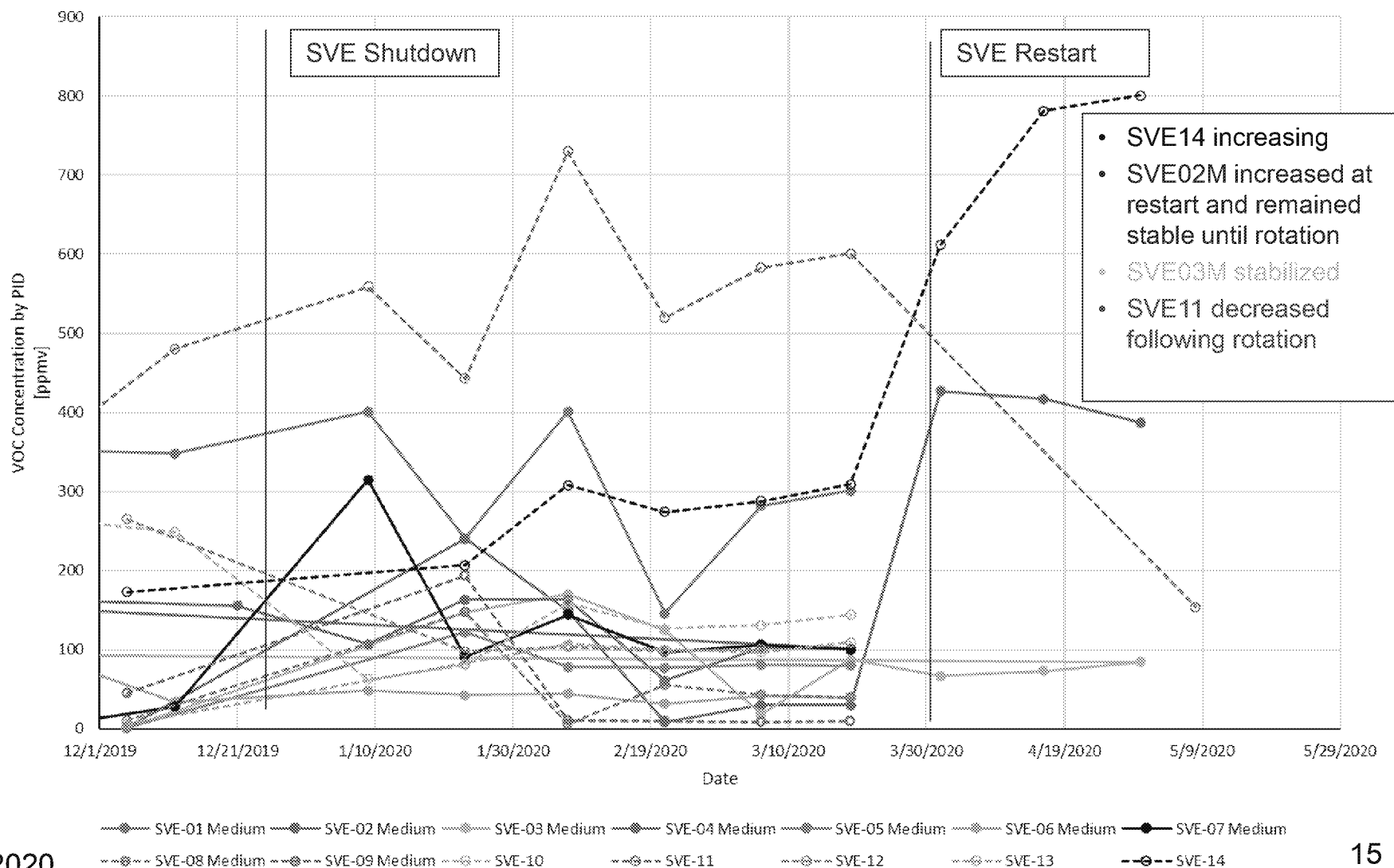
14

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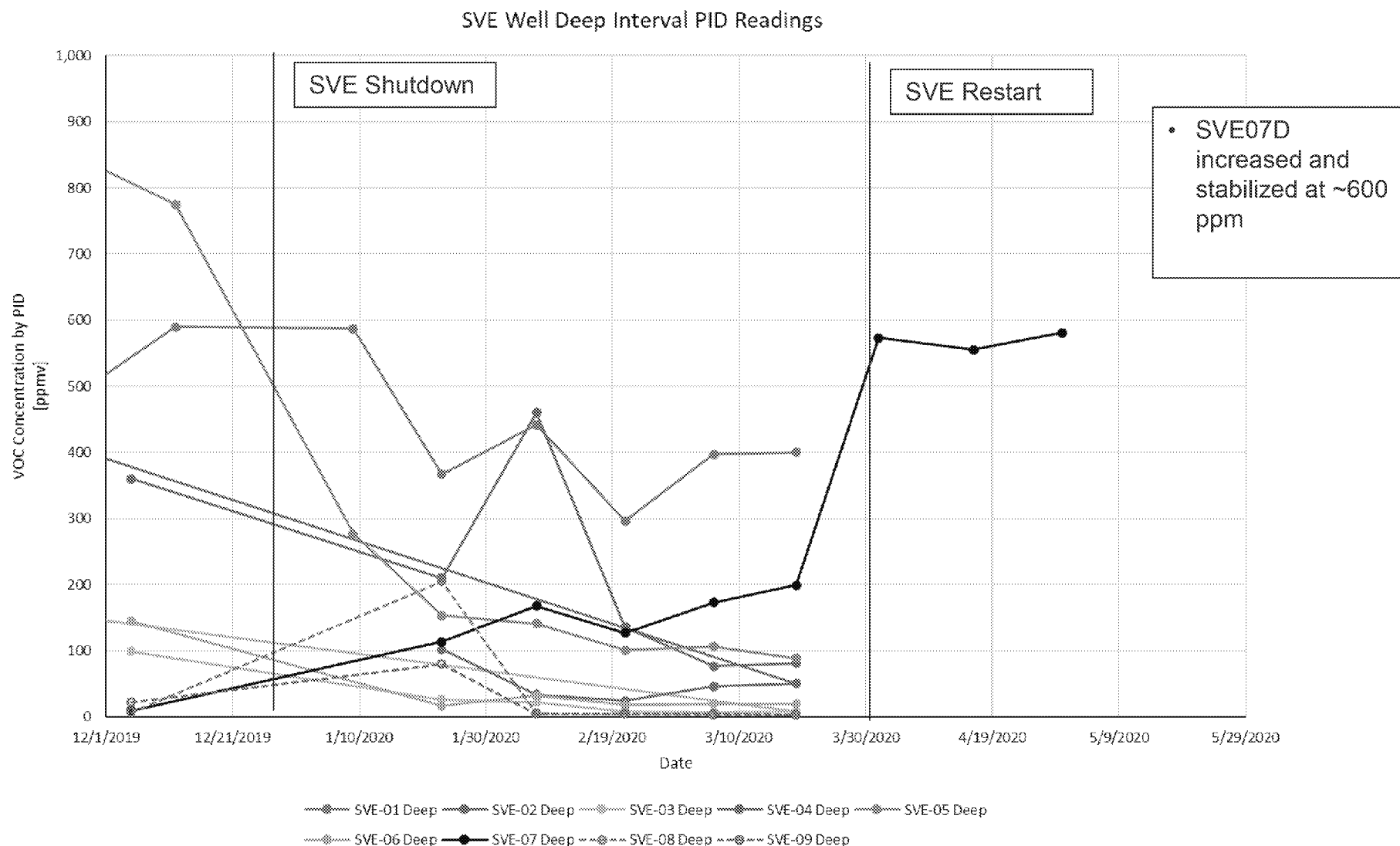
# Site ST012 SVE System Post-Rebound Middle Interval Zone (PID)

SVE Well Middle Interval PID Readings



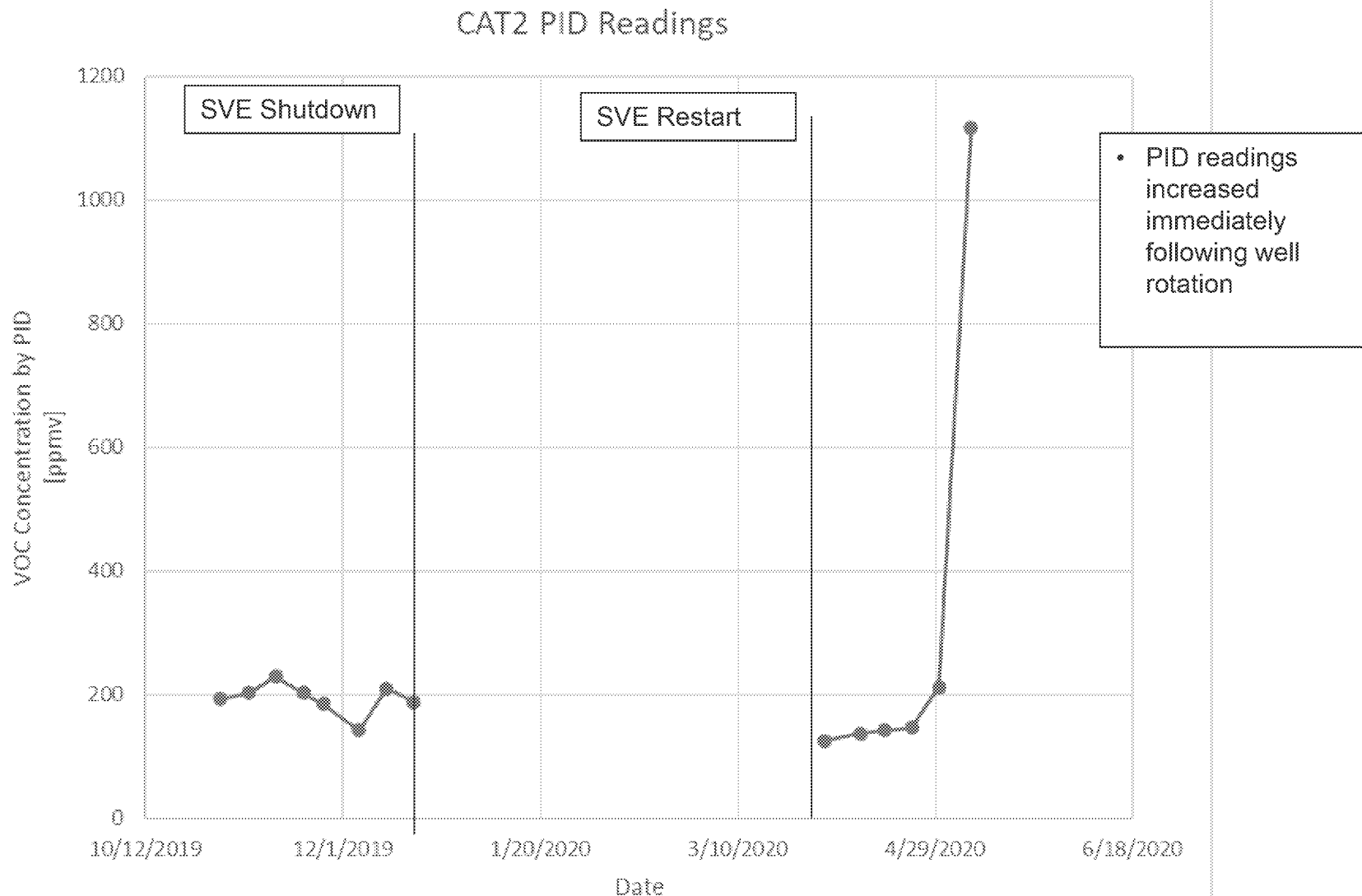


# Site ST012 SVE System Post-Rebound Deep Interval Zone (PID)



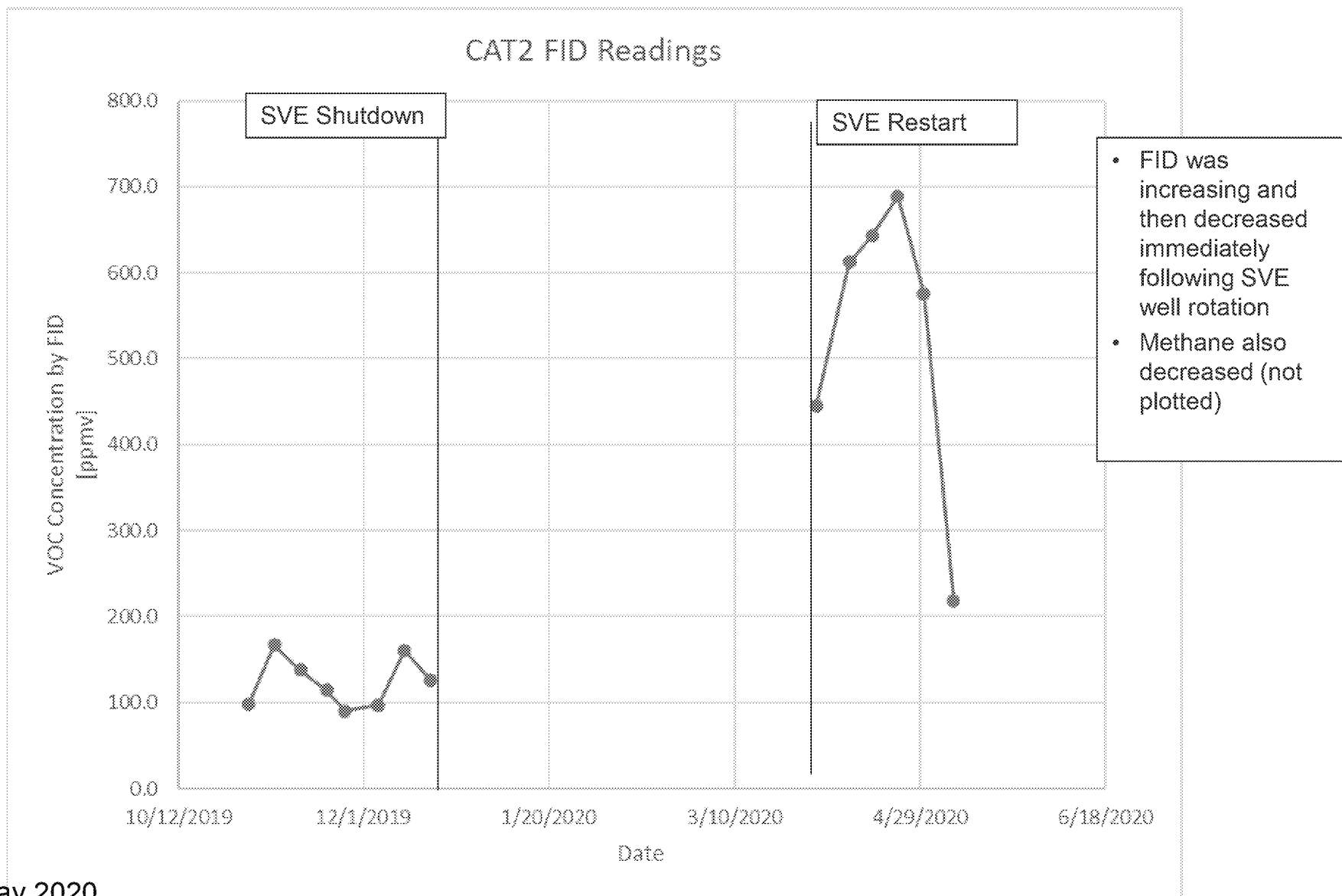


# Site ST012 SVE System Post-Rebound CAT 2 (PID)





# Site ST012 SVE System Post-Rebound CAT 2(FID)





# Site ST012 SVE Wells Rotation May

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- **Vacuum readings collected from venting wells at to rotation (prior to rotation unless noted)**
- **Shallow Zone**
  - SVE01S vented – 0.7" H<sub>2</sub>O
  - SVE07S vented – 2.7" H<sub>2</sub>O
- **Medium Zone**
  - SVE02M vented and measured after rotation – 15.4" H<sub>2</sub>O
- **Deep Zone**
  - SVE01D vented – 0.5" H<sub>2</sub>O
  - SVE07D vented – 2.2" H<sub>2</sub>O
- **Vacuum readings indicate venting wells are likely pulling in some air**
- **Readings still to be collected in other venting SVE wells in medium zone**



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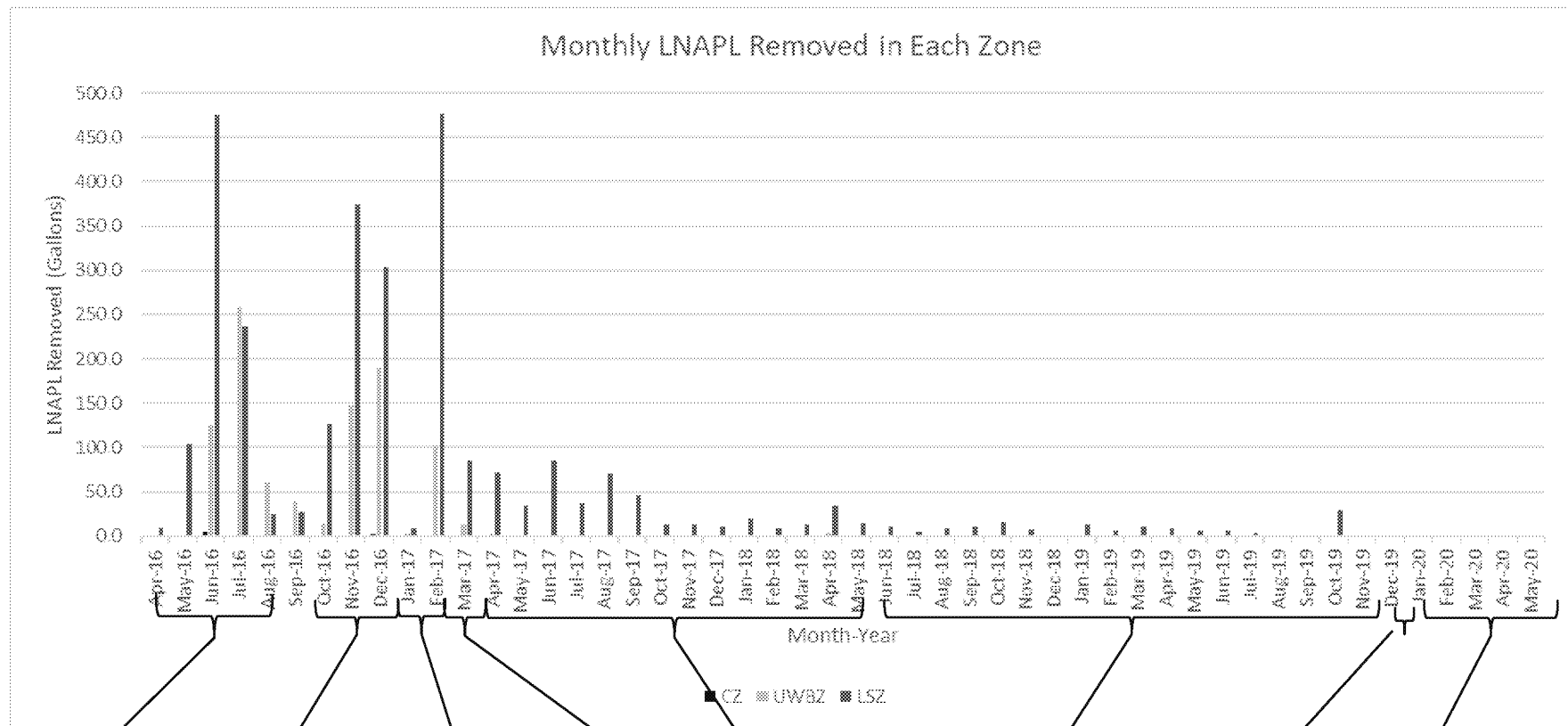
# **LNAPL Removal Update (through 13 May)**





# ST012 LNAPL Removal Summary

- CZ – 7.75 gallons of LNAPL removed. None since Feb 2020
- UWBZ – 963 gallons of LNAPL removed. None since Apr 2019
- LSZ – 2,875 gallons of LNAPL removed. 0.5 since Apr 2020 (LSZ36)



Removal  
following initial  
eductor  
removals  
21 May 2020

Removal  
following  
remaining  
eductor  
removals

Diminished  
removal due  
to pump  
failure

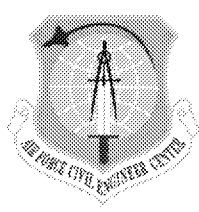
Recovery  
following  
pump  
replacement

<100 gal/mo

<20 gal/mo

30 gal from  
LSZ43  
during pump  
maintenance

<1 gal/mo



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# **Preliminary Second Quarter Groundwater Sampling Results**



# Sampling Summary

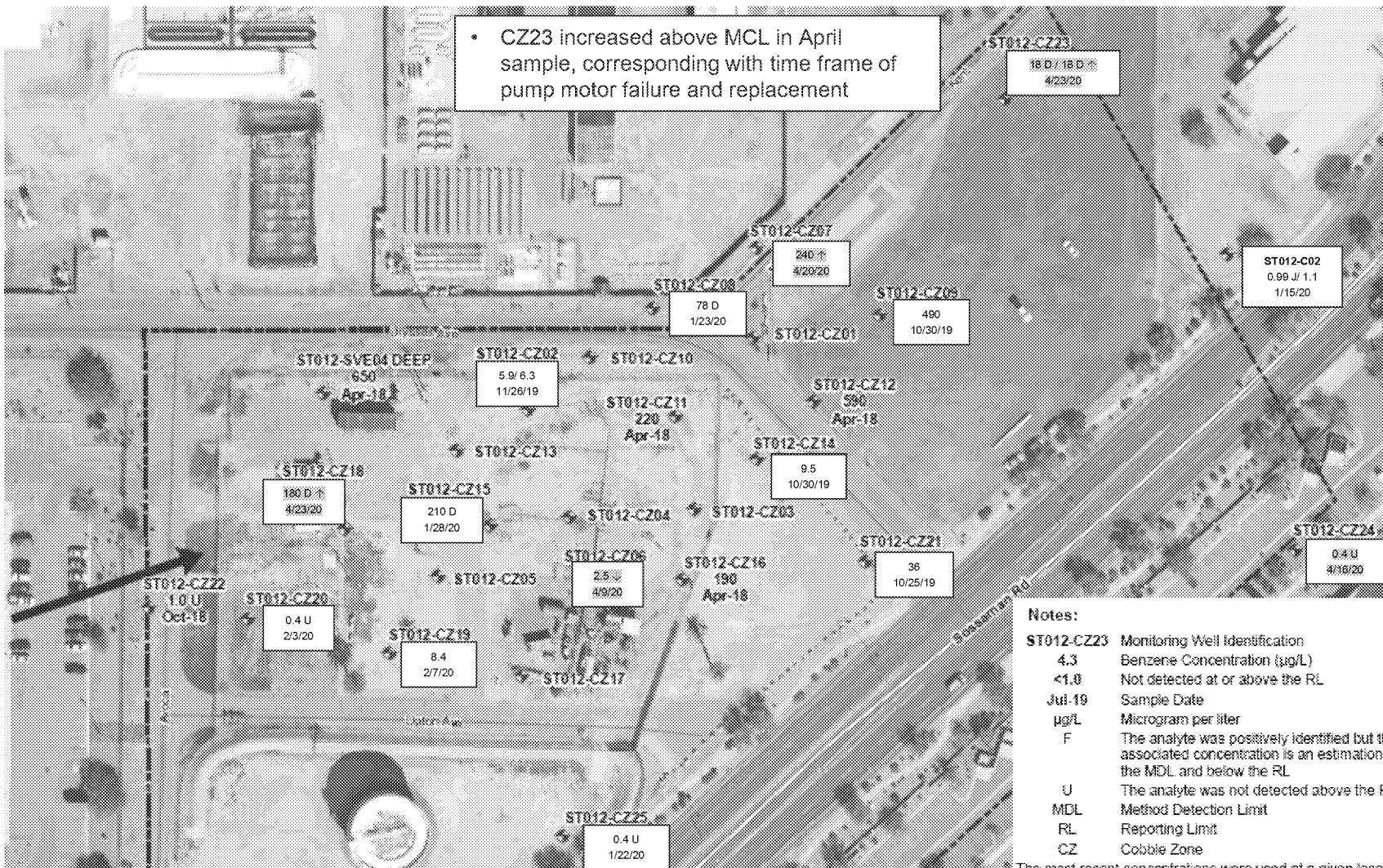
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- **Sampling includes:**
  - Extraction Wells
  - Injection Wells (where injections took place)
  - Monitoring Wells (in areas where injections took place)
  - Perimeter Wells
- **General Observations**
  - New sulfate results in since last update



# Site ST012 Benzene ( $\mu\text{g/L}$ ) in CZ for Q1-Q2 2020

- CZ23 increased above MCL in April sample, corresponding with time frame of pump motor failure and replacement



## Notes:

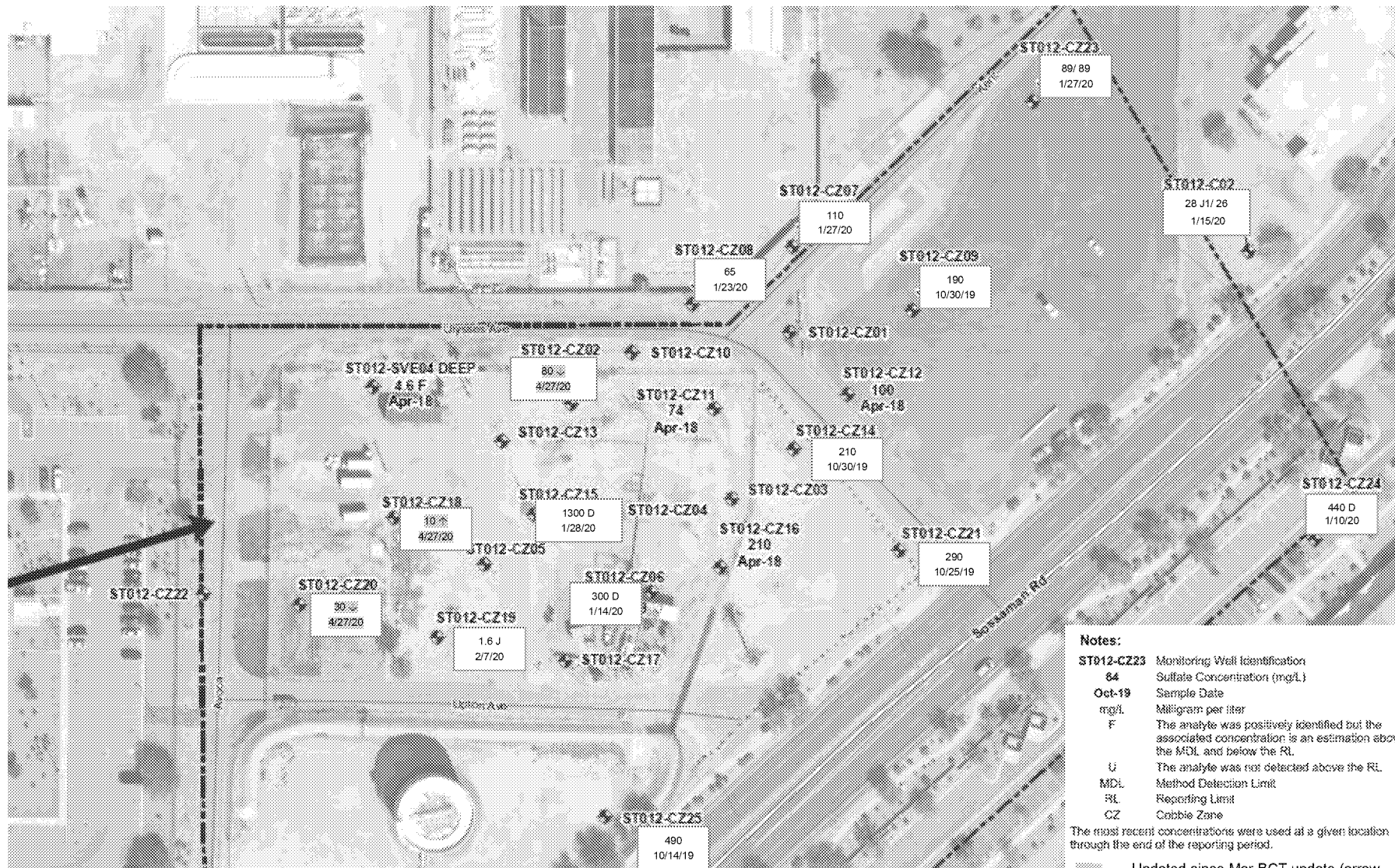
ST012-CZ23	Monitoring Well Identification
4.3	Benzene Concentration ( $\mu\text{g/L}$ )
<1.0	Not detected at or above the RL
Jul-19	Sample Date
$\mu\text{g/L}$	Microgram per liter
F	The analyte was positively identified but the associated concentration is an estimation above the MDL and below the RL
U	The analyte was not detected above the RL
MDL	Method Detection Limit
RL	Reporting Limit
CZ	Cobble Zone

The most recent concentrations were used at a given location through the end of the reporting period.

Updated since Mar BCT update (arrow indicates direction of change from previous result)  
D Sample was diluted



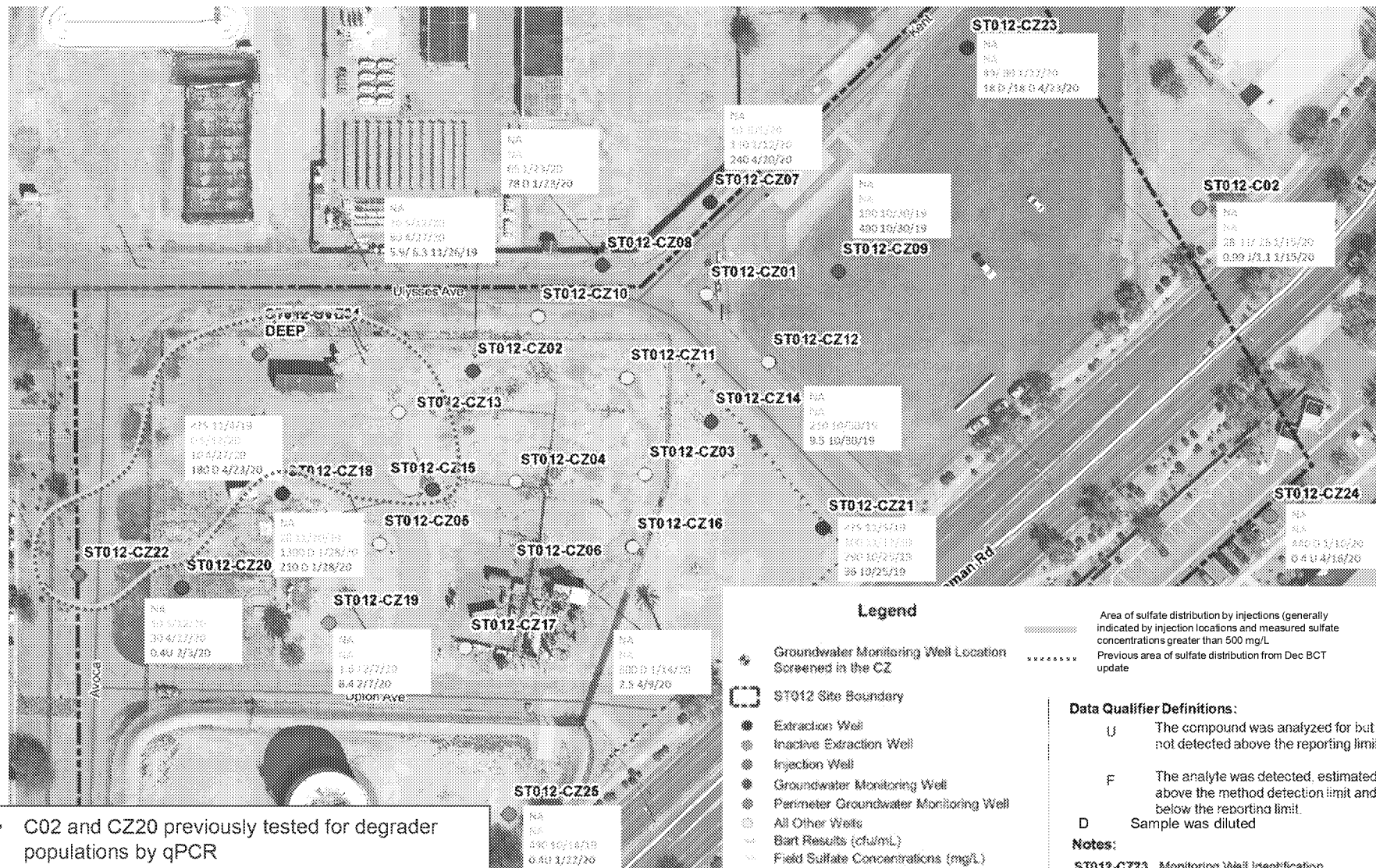
# Site ST012 Sulfate (mg/L) in CZ for Q1-Q2 2020



Updated since Mar BCT update (arrow indicates direction of change from previous result)



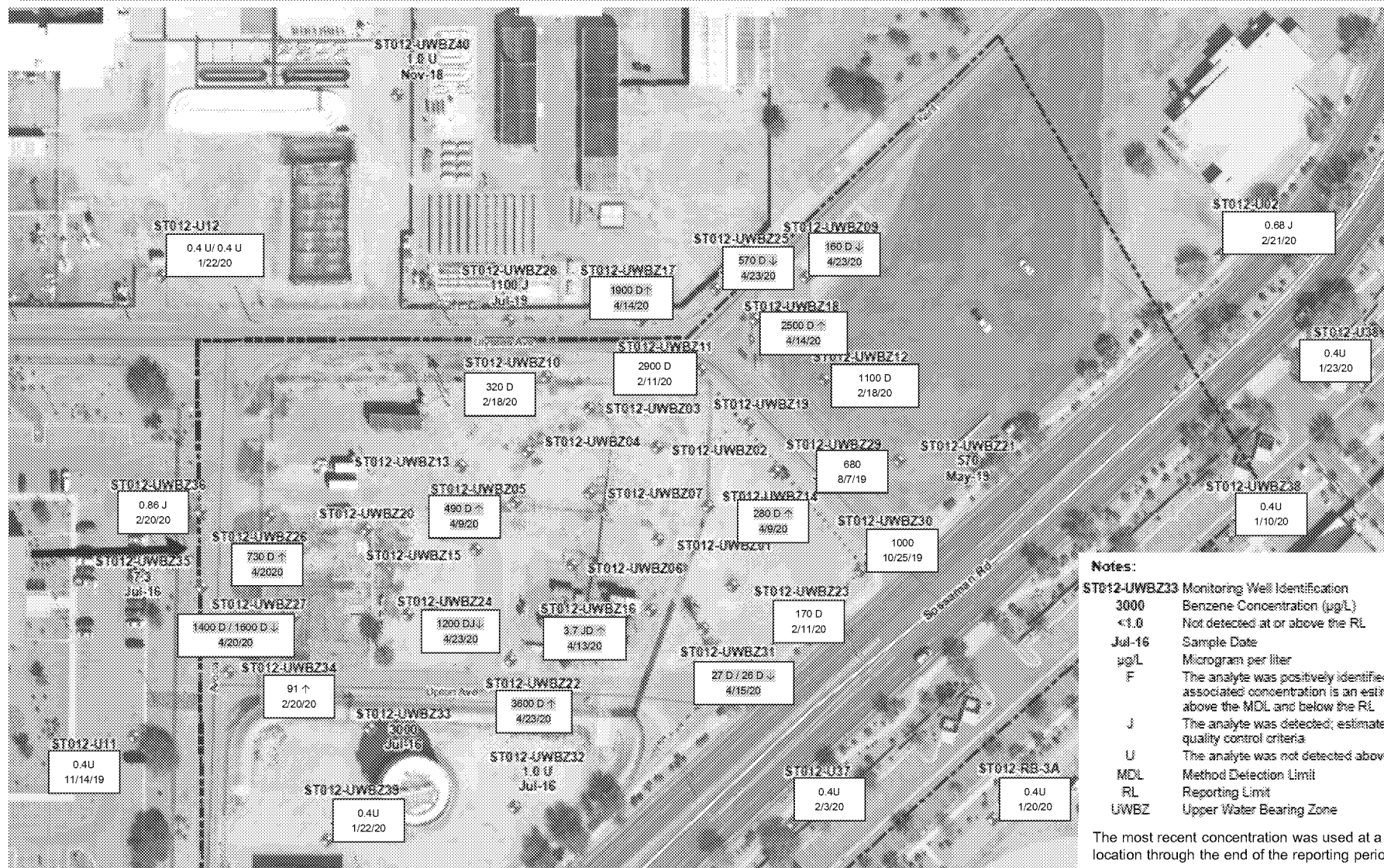
# EBR Treatment Area in CZ for Q1-Q2 2020



21 May 2020



# Site ST012 Benzene ( $\mu\text{g/L}$ ) in UWBZ for Q1-Q2 2020



21 May 2020

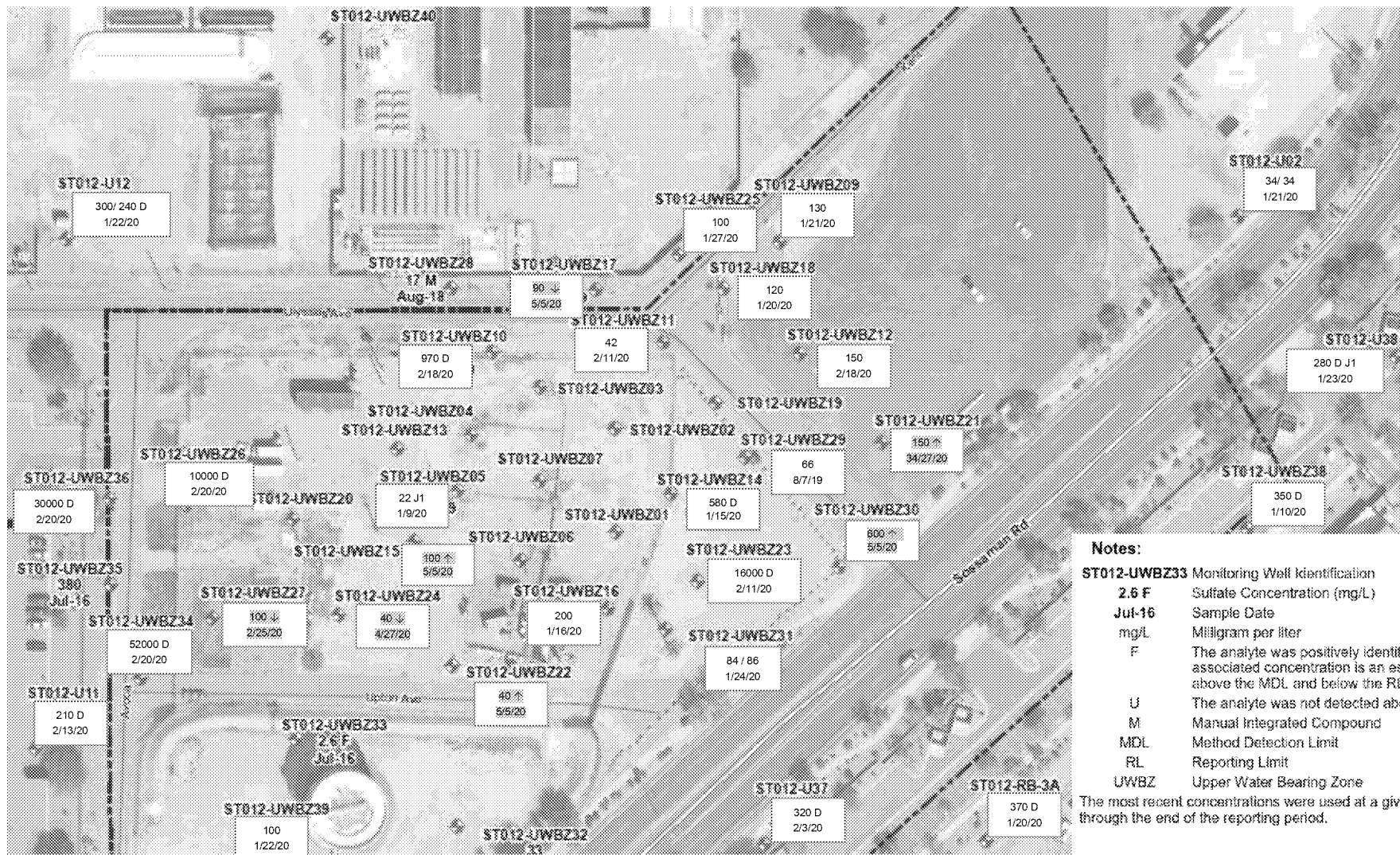
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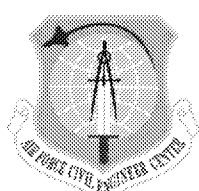




# Site ST012 Sulfate (mg/L) in UWBZ for Q1-Q2 2020





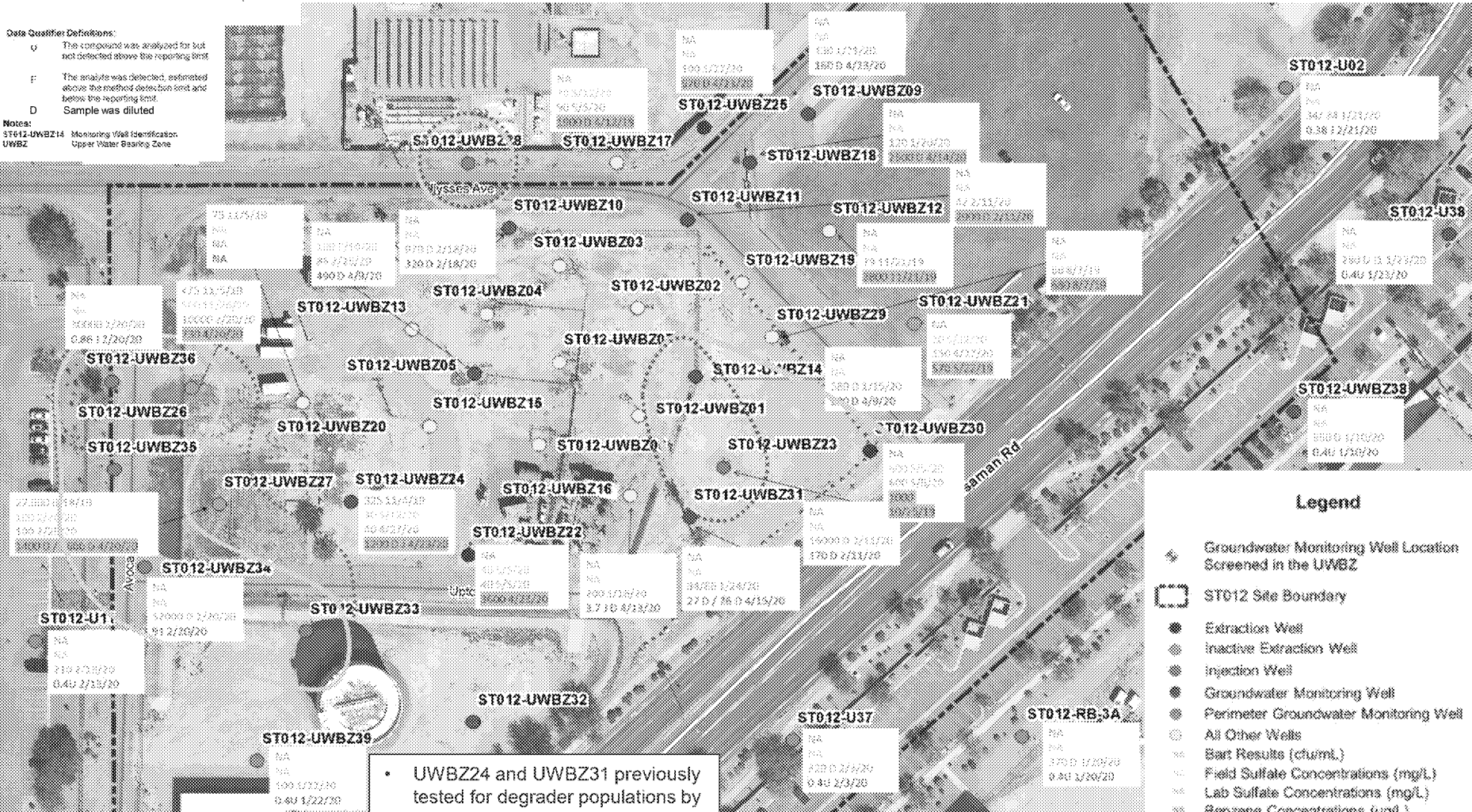


# EBR Treatment Areas in UWBZ for Q1-Q2 2020

Area of sulfate distribution by injections (generally indicated by injection locations and measured sulfate concentrations greater than 500 mg/L).  
Previous area of sulfate distribution from Dec BCT update

**Data Qualifier Definitions:**  
O The compound was analyzed for but not detected above the reporting limit  
F The analyte was detected, estimated above the method detection limit and below the reporting limit  
D Sample was diluted

**Notes:**  
ST012-UWBZ14 Monitoring Well Identification  
UWBZ Upper Water Bearing Zone



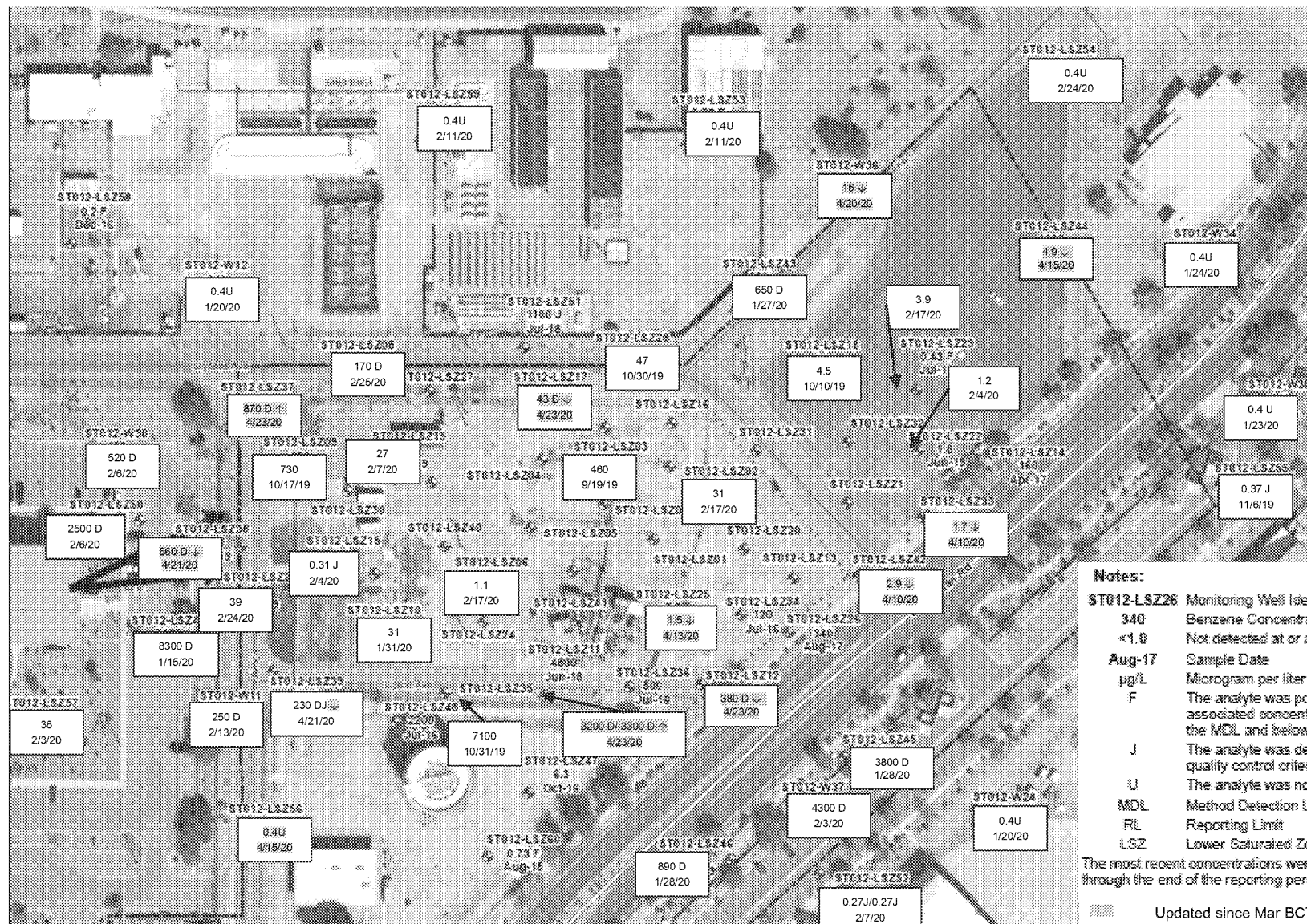
## Legend

- Groundwater Monitoring Well Location Screened in the UWBZ
- ST012 Site Boundary
- Extraction Well
- Inactive Extraction Well
- Injection Well
- Groundwater Monitoring Well
- Perimeter Groundwater Monitoring Well
- All Other Wells
- Bart Results (cfu/mL)
- Field Sulfate Concentrations (mg/L)
- Lab Sulfate Concentrations (mg/L)
- Benzene Concentrations (ug/L)
- Benzene Concentration greater than 500ug/L
- Benzene Concentration greater than 500ug/L

• UWBZ24 and UWBZ31 previously tested for degrader populations by qPCR



# Site ST012 Benzene ( $\mu\text{g/L}$ ) in LSZ for Q1-Q2 2020



## Notes:

ST012-LSZ26 Monitoring Well Identification

340 Benzene Concentration ( $\mu\text{g/L}$ )

<1.0 Not detected at or above the RL

Aug-17 Sample Date

$\mu\text{g/L}$  Microgram per liter

F The analyte was positively identified but the associated concentration is an estimation above the MDL and below the RL

J The analyte was detected; estimated due to quality control criteria

U The analyte was not detected above the RL

MDL Method Detection Limit

RL Reporting Limit

LSZ Lower Saturated Zone

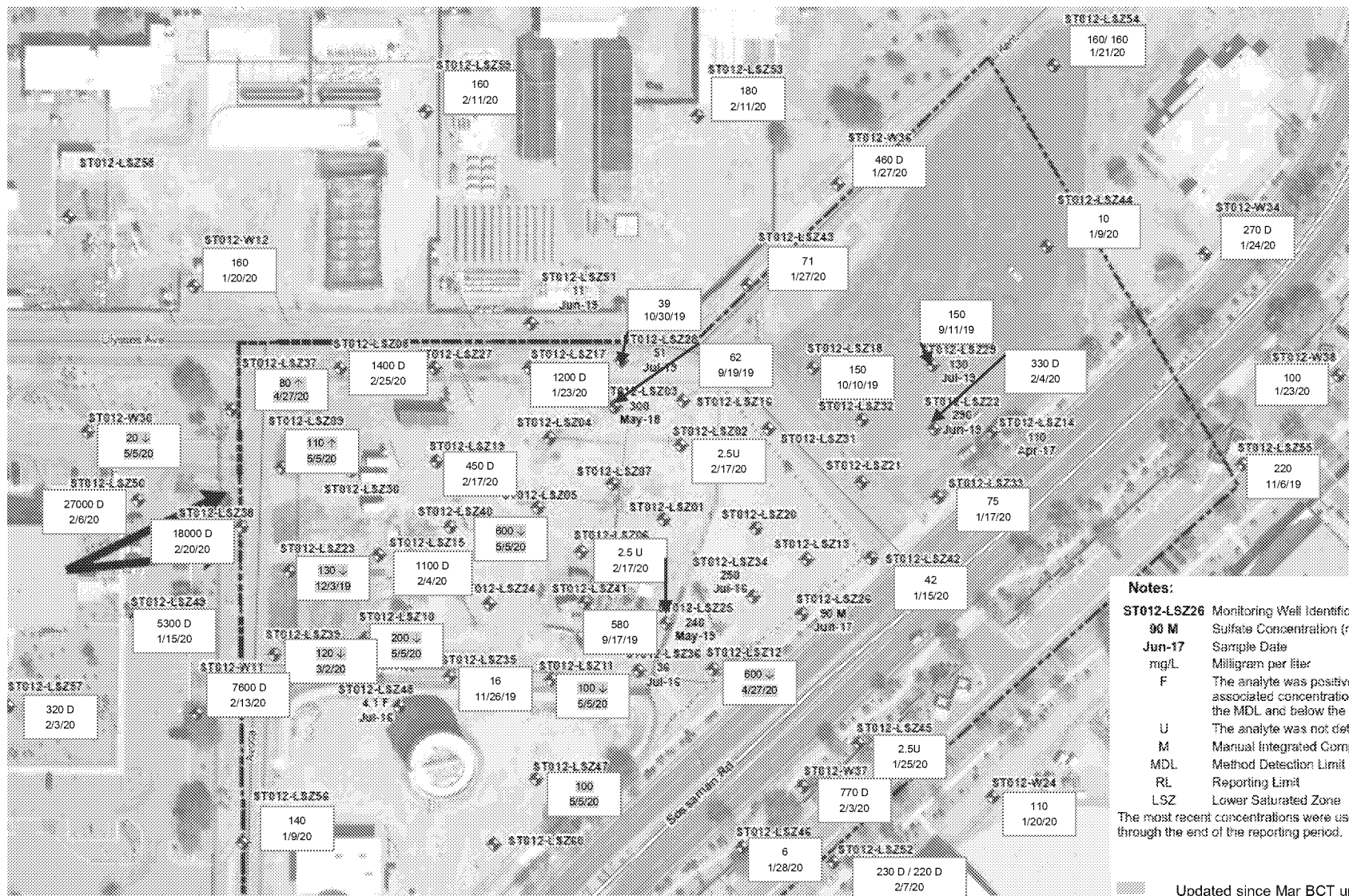
The most recent concentrations were used at a given location through the end of the reporting period.

Updated since Mar BCT update (arrow indicates direction of change from previous result)

D Sample was diluted

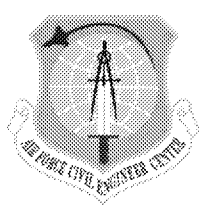


# Site ST012 Sulfate (mg/L) in LSZ for Q1-Q2 2020



21 May 2020

D Sample was diluted



# EBR Treatment Areas in LSZ for Q1-Q2 2020

- LSZ10 and LSZ42 previously tested for degrader populations by qPCR

Area of sulfate distribution by injections (generally indicated by injection locations and measured sulfate concentrations greater than 500 mg/L)  
Previous area of sulfate distribution from Dec BCT update

## Data Qualifier Definitions:

- U The compound was analyzed for but not detected above the reporting limit.
- F The analysis was detected, estimated above the method detection limit and below the reporting limit.
- D Sample was diluted for analysis

## Notes:

- ST012-LSZ Monitoring Well Identification
- LSZ Lower Saturated Zone

ST012-W34  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W38  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W39  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W35  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W36  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W37  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W38  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W39  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W40  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W41  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W42  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W43  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

ST012-W44  
NA  
NA  
1.30 11/27/19  
0.40 2/24/20

## Legend

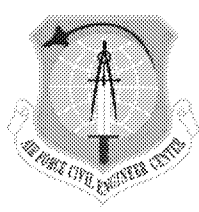
- Groundwater Monitoring Well Location Screened in the LSZ
- ST012 Site Boundary
- Extraction Well
- Inactive Extraction Well
- Injection Well
- Groundwater Monitoring Well
- Perimeter Groundwater Monitoring Well
- All Other Wells
- Bart Results (cfu/mL)
- Field Sulfate Concentrations (mg/L)
- Lab Sulfate Concentrations (mg/L)
- Benzene Concentrations (ug/L)
- Benzene Concentration greater than 500ug/L



# Site ST012 Biological Testing

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- **First set of BioTraps<sup>®</sup> pulled out from UWBZ26, UWBZ27, LSZ38, and LSZ39 on 30 Mar 2020**
  - Both sets came out, second set was immediately redeployed
- **Second set of BioTraps<sup>®</sup> pulled out from UWBZ26, UWBZ27, LSZ38, and LSZ39 on 20 Apr 2020**
- **Anticipated receipt of results early Jun (SIP and QuantArray Petro)**



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# Pilot Study Injection/Extraction Update





# Site ST012 Extraction System Performance

Extraction Well	Calculated Average Extraction Rate in Period gpm	Maximum Temperature Since May 2018 °F	Most Recent Temperature °F	Cumulative Extraction Since May 2018 gallons	Note
ST012-CZ07	6.1	175	139	5,276,797	
ST012-CZ18	Off	136	126	3,019,867	Extraction stopped due to sulfate presence (Oct 2019)
ST012-CZ19	NA		103		Eliminated as an extraction well by FVM#7
ST012-CZ21	0.0	150	115	452,498	Totalizer reading suspect. Pump shut down due to low concentrations.
ST012-CZ23	0.0	114	102	750,386	Motor replaced
CZ Subtotal				9,499,549	
ST012-UWBZ21	18.6	170	162	638,328	Submersible installed but only runs for a few minutes/day (high temp)
ST012-UWBZ22	8.20	146	60	482,265	Pneumatic plugged, runs intermittently
ST012-UWBZ25	8.9	168	155	707,212	
ST012-UWBZ26	Off	133	114	2,408,709	Extraction stopped due to sulfate presence (Sep 2019)
ST012-UWBZ27	Off	128	94	130,011	Extraction stopped due to sulfate presence (May 2019)
ST012-UWBZ30	Off	172	128	2,527,610	Submersible installed
UWBZ Subtotal*				8,162,568	
ST012-LSZ09	Off	140	130	2,748,461	Extraction stopped due to sulfate presence (Oct 2019)
ST012-LSZ11	14.9	141	96	4,877,722	
ST012-LSZ12	5.9	130	100	3,089,114	
ST012-LSZ23	Off	113	94	3,638,934	Extraction stopped due to sulfate presence (Aug 2019)
ST012-LSZ28	---	162	165	23,131	Intermittent pumping for warm makeup water.
ST012-LSZ29	NA	>170		17	Eliminated as an extraction well by FVM#7
ST012-LSZ37	NA	132	90	6,706,323	Extraction stopped to avoid pulling sulfate from BioTrap locations
ST012-LSZ38	Off	160	90	941,898	Extraction stopped due to sulfate presence (Aug 2019)
ST012-LSZ39	Off	92	78	1,250,933	Extraction stopped due to sulfate presence (May 2019)
ST012-LSZ43	4.1	150	150	1,385,690	
ST012-UWBZ28/LSZ51	NA	146	128	2,536,868	Extraction stopped (Aug 2019), changed to injection end of subphase 2
W36	NA	81	81	386,615	Only used for make up water for sulfate mixing
LSZ Subtotal*				25,930,657	
Total of Wells	66.7			43,979,389	
Treatment System	38.3			35,981,390	

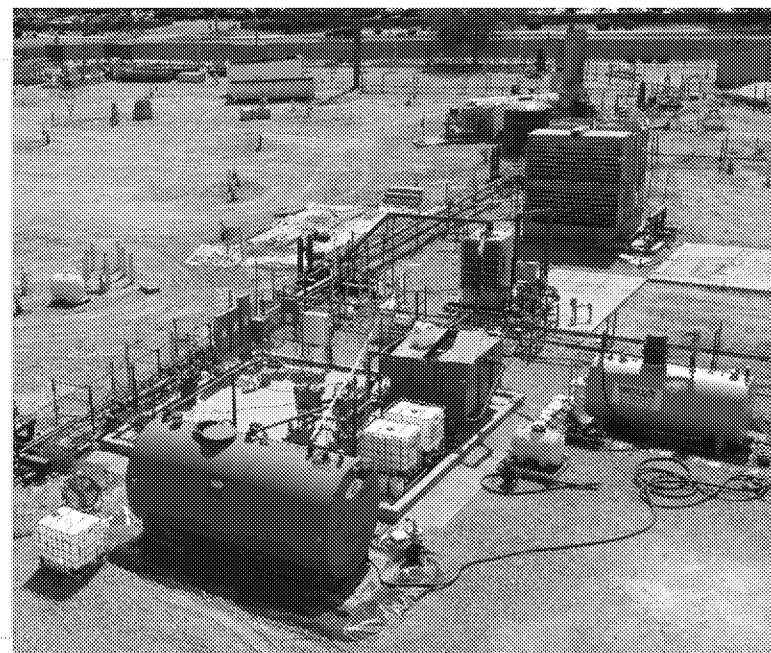
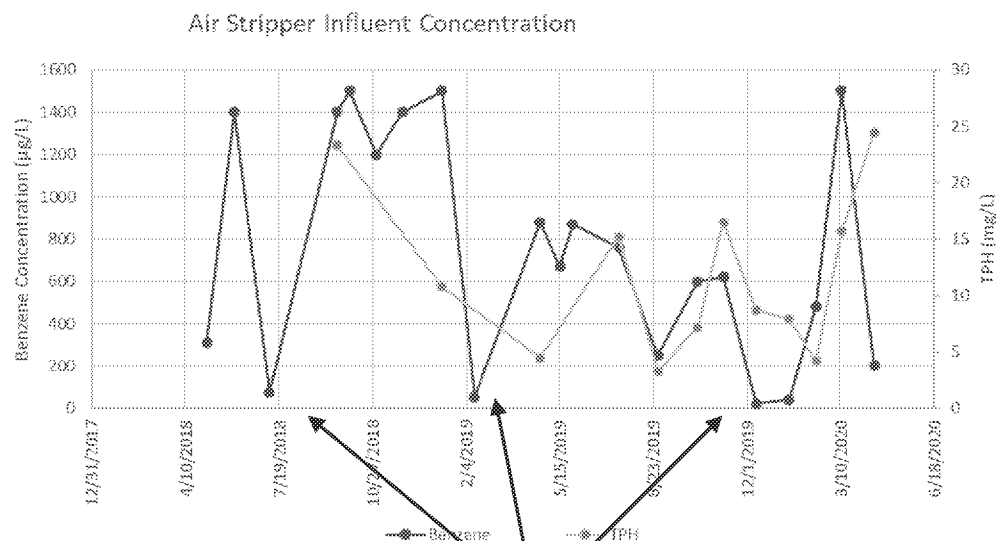
Data is preliminary

\* Includes 1/2 of ST012-UWBZ28/LSZ51



# Site ST012 Extraction System Performance

- No LNAPL has been recovered since extraction started up
- Extraction pumps UWBZ21 and UWBZ22 pumping intermittently
- CZ18, CZ21, UWBZ26, UWBZ27, UWBZ30, LSZ09, LSZ23, LSZ29, LSZ37, LSZ38, and LSZ39 turned off due to sulfate presence and SIP testing
- Benzene air stripper influent decreased to 200  $\mu\text{g/L}$  for April sample (May not yet available). TPH concentration increased.

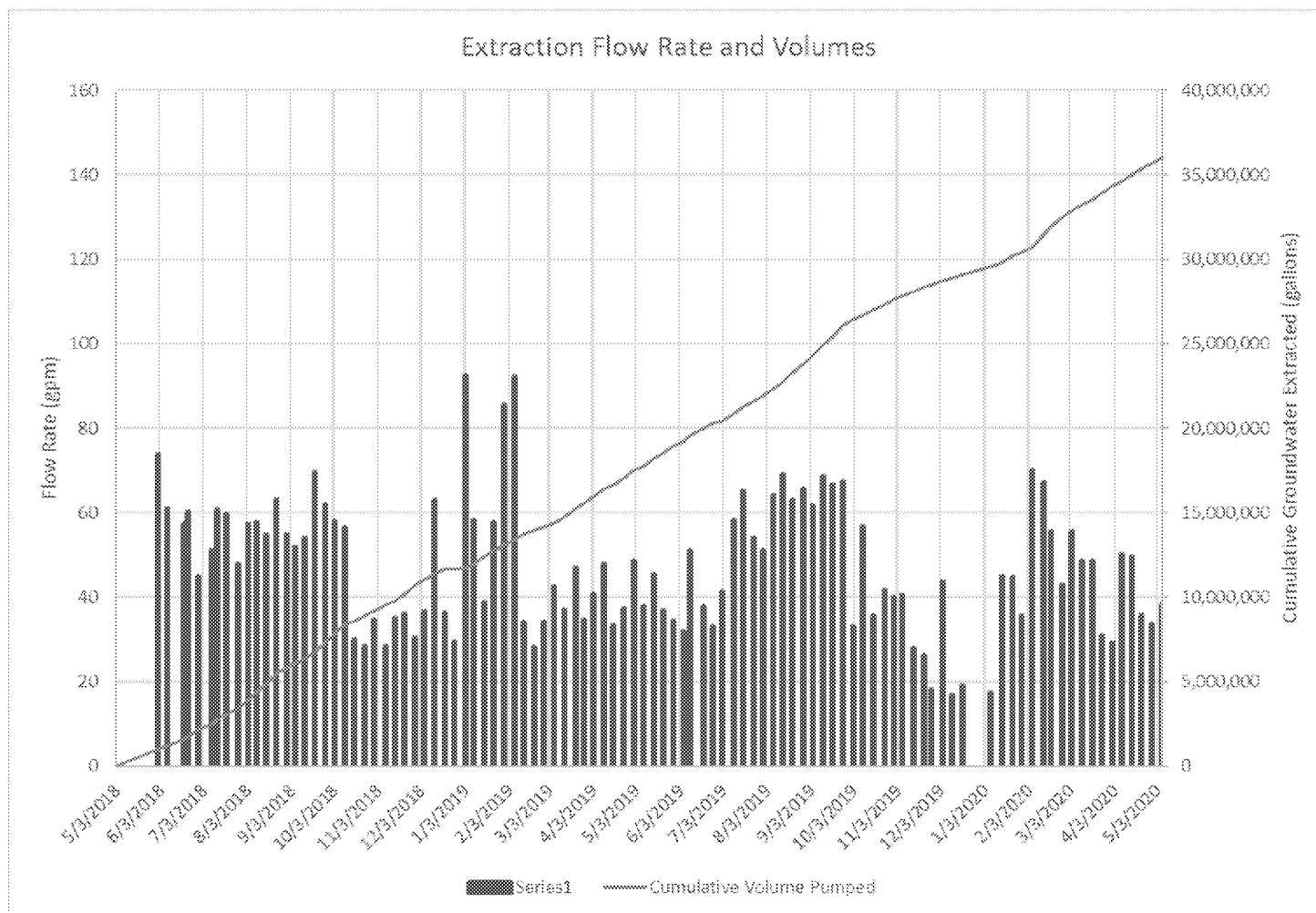






# Site ST012 Extraction System Performance

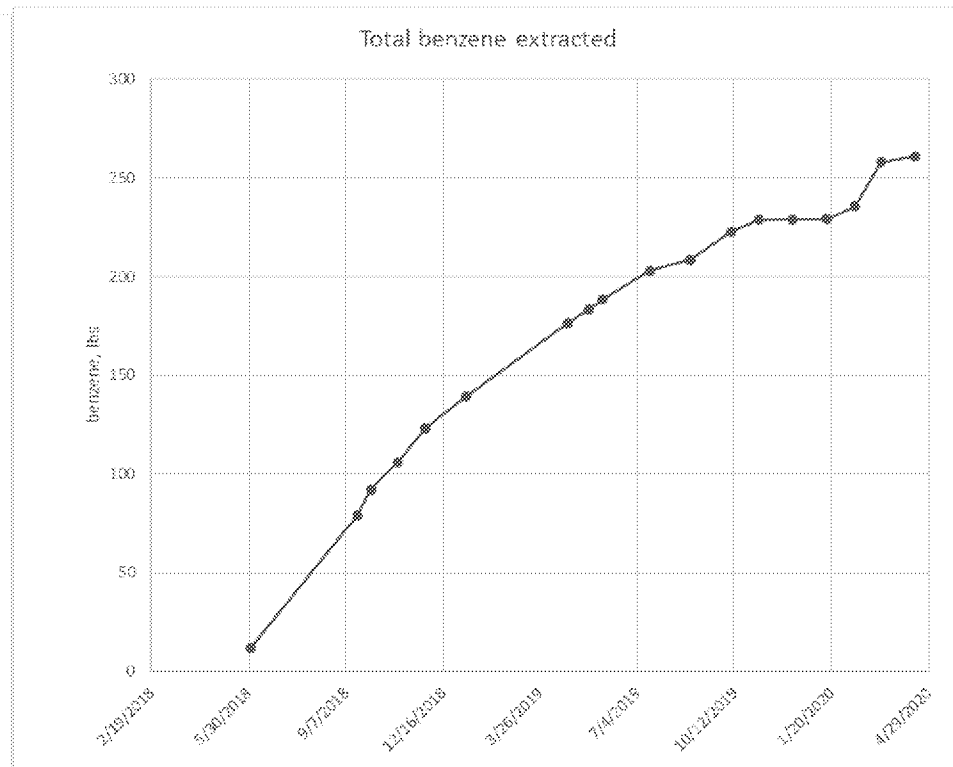
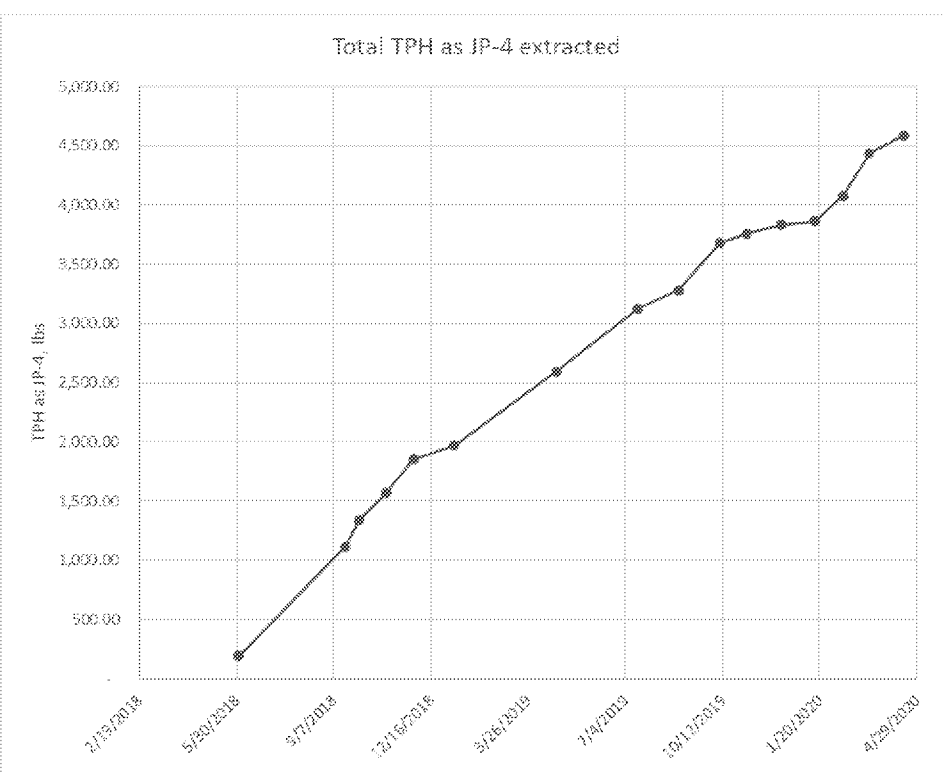
- Overall Extraction Rates and Cumulative Volume Extracted





# Site ST012 Extraction System Performance

- Estimated Mass Removal by Extraction





# Site ST012 Sulfate Field Screening

Date	Sulfate Concentration (mg/L)														
	CZ02	CZ03	CZ05	CZ10	CZ13	CZ16	CZ18	CZ07	CZ20	CZ21	UWBZ15	UWBZ17	UWBZ21	UWBZ22	UWBZ24
10/29/2019	90	80	80	100	100	110	80	70	80	100	120	---	90	80	0
11/5/2019	90	---	---	---	---	---	100	---	60	70	---	---	100	---	0
11/12/2019	---	---	---	---	---	---	---	80	---	100	110	---	---	130	---
11/20/2019	120	140	20	240	0	210	650	3000	380	OFF	100	---	20	0	700
11/26/2019	140	---	---	---	---	---	30	---	10	Off	---	---	Off	---	450
12/3/2019	---	---	---	---	---	---	---	100	---	off	130	---	---	10	---
12/10/2019	120	---	---	---	---	---	140	---	110	off	---	---	40	---	100
12/17/2019	---	---	---	---	---	---	---	100	140	off	140	---	---	40	---
1/8/2020	130	---	---	---	---	---	145	---	140	off	---	140	50	---	100
1/14/2020	---	---	---	---	---	---	---	130	---	off	20	---	---	Error00	---
1/21/2020	340	---	---	---	---	---	20	---	80	off	---	180	100	---	80
1/27/2020	---	---	---	---	---	---	---	120	---	off	50	---	---	100	---
2/4/2020	400	---	---	---	---	---	90	---	120	off	---	210	140	---	80
2/11/2020	---	---	---	---	---	---	---	100	---	Off	70	---	---	60	---
2/18/2020	300	---	---	---	---	---	80	---	100	off	---	100	100	---	350
2/25/2020	---	---	---	---	---	---	---	60	---	off	130	50	---	30	---
3/2/2020	300	---	---	---	---	---	70	---	80	off	---	60	80	---	1200
3/10/2020	---	---	---	---	---	---	---	50	---	off	100	50	---	50	---
3/17/2020	250	---	---	---	---	---	60	---	50	off	---	20	40	---	800
3/24/2020	---	---	---	---	---	---	---	60	---	off	80	30	---	40	---
4/1/2020	220	---	---	---	---	---	40	---	40	off	---	10	20	---	400
4/7/2020	---	---	---	---	---	---	---	10	---	off	140	50	---	20	---
4/14/2020	60	---	---	---	---	---	0	---	40	off	---	70	90	---	40
4/22/2020	---	---	---	---	---	---	---	10	---	Off	130	80	---	30	---
4/27/2020	80	---	---	---	---	---	10	---	30	off	---	90	50	---	40
5/5/2020	---	---	---	---	---	---	---	10	---	Off	100	90	---	40	---
5/12/2020	70	---	---	---	---	---	0	---	10	off	---	70	20	---	30
5/19/2020	---	---	---	---	---	---	---	---	---	Off	---	---	---	---	---

	Screening location is an extraction location
	Screening location is a monitoring well

CZ18, CZ21, extraction shut down.

Suspect field screening results in October and November not included

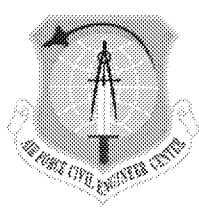


# Site ST012 Sulfate Field Screening

Date	Sulfate Concentration (mg/L)																			
	UWBZ26	UWBZ27	UWBZ28/LSZ51	UWBZ30	LSZ09	LSZ10	LSZ11	LSZ12	LSZ15	LSZ19	LSZ23	LSZ35	LSZ37	LSZ38	LSZ39	LSZ40	LSZ43	LSZ44	LSZ47	W30
10/29/2019	100	100	off	100	70	80	90	90	70	90	70	100	80	90	100	80	90	80	0	100
11/5/2019	110	---	off	70	90	90	---	70	---	---	90	---	230	60	80	60	---	---	---	---
11/12/2019	100	90	---	80	90	100	---	---	---	---	90	---	150	70	---	70	---	---	0	100
11/20/2019	600	480	OFF	OFF	790	470	120	2000	630	300	720	4000	400	7000	900	230	OFF	540	0	300
11/26/2019	500	---	off	off	650	350	---	600	---	---	off	---	530	400	---	90	---	---	---	100
12/3/2019	ERROR	350	---	off	320	370	360	---	---	---	130	---	60	1060	---	200	---	---	0	-
12/10/2019	off	---	off	off	700	350	---	420	---	---	off	---	100	800	460	570	---	---	---	---
12/17/2019	off	300	---	off	310	370	200	---	---	---	off	---	120	750	---	550	---	---	0	130
1/8/2020	off	---	off	off	300	410	---	350	---	---	off	---	100	770	450	520	---	---	---	160
1/14/2020	off	40	---	off	80	330	370	---	---	---	off	---	20	450	---	124	---	---	0	---
1/21/2020	off	---	off	off	30	340	---	460	---	---	z	---	70	320	230	680	---	---	---	---
1/27/2020	off	40	---	260	4000	310	3530	---	---	---	off	---	---	210	---	660	---	---	500	200
2/4/2020	off	---	off	---	400	300	---	360	---	---	off	---	420	370	200	150	---	---	---	---
2/11/2020	injecting	50	---	400	30	40	420	0	---	---	off	---	---	300	---	680	---	---	0	180
2/18/2020	off	---	off	---	50	80	---	220	---	---	off	---	430	240	160	500	---	---	---	---
2/25/2020	BioTrap	100	---	440	40	240	440	---	---	---	off	---	---	Bio Trap	---	700	---	---	0	80
3/2/2020	off	---	off	---	40	250	---	200	---	---	off	---	400	Bio Trap	120	600	---	---	---	---
3/10/2020	BioTrap	biotrap	---	380	50	---	300	---	---	---	off	---	---	Bio Trap	---	490	---	---	0	70
3/17/2020	off	---	off	off	---	200	---	200	---	---	off	---	300	Bio Trap	Biotrap	430	---	---	---	---
3/24/2020	BioTrap	BioTrap	---	360	50	---	200	---	---	---	off	---	---	Bio Trap	---	450	---	---	0	70
4/1/2020	off	---	off	off	---	120	---	150	---	---	off	---	200	Bio Trap	Biotrap	350	---	---	---	---
4/7/2020	BioTrap	BioTrap	---	620	140	---	120	---	---	---	off	---	---	Bio Trap	---	200	---	---	0	20
4/14/2020	off	---	off	off	---	180	---	680	---	---	off	---	60	Bio Trap	Biotrap	760	---	---	---	---
4/22/2020	BioTrap	BioTrap	---	590	120	210	130	---	---	---	off	---	---	Bio Trap	---	690	---	---	0	20
4/27/2020	off	---	off	off	---	200	---	600	---	---	off	---	80	Bio Trap	Biotrap	650	---	---	---	---
5/5/2020	BioTrap	BioTrap	---	600	110	200	100	---	---	---	off	---	---	Bio Trap	---	600	---	---	100	10
5/12/2020	off	---	off	off	---	170	---	600	---	---	off	---	100	Bio Trap	Biotrap	580	---	---	---	---
5/19/2020	BioTrap	BioTrap	---	---	---	---	---	---	---	---	off	---	---	Bio Trap	---	---	---	---	---	---

	Screening location is an extraction location
	Screening location is a monitoring well

UWBZ26, UWBZ27, UWBZ30, UWBZ28/LSZ51, LSZ09, LSZ23, LSZ37, LSZ38 and LSZ39 extraction shut down.  
 Suspect field screening results in October and November not included  
 Concentration in UWBZ30 shut down – post shut down samples collected  
 LSZ12 sulfate increased (consider for shut down)



# Site ST012 Path Forward May-Jun 2020

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- **Continue SVE**
- **Continue pump repairs if necessary**
- **Pilot Study Implementation**
  - Continue extraction and treatment
  - Receive 30 Mar 2020 BioTraps® SIP and QuantArray Petro results ~ early Jun 2020
  - Receive 20 Apr 2020 BioTraps® SIP and QuantArray Petro results ~ early Jun 2020
  - Preparation of Pilot Study Implementation Report
  - Continue with sulfate screening and quarterly sampling

# **Air Force Civil Engineer Center**

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***2020 BCT  
MEETINGS/CONFERENCE  
CALLS SCHEDULE  
DELIVERABLE TRACKING***

**BCT Conference Call  
21 May 2020**

# Air Force Civil Engineer Center

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## BCT GENERAL UPDATE AND ACTION ITEMS

**BCT Conference Call  
21 May 2020**